Biogeochemical Cycles

On a sheet of plain white paper:

Draw a line to mark half way (from side to side) You will draw the 4 cycles, each cycle will take up half a page, and label them as follows:

1. Copy the diagram in the text, or make a similar one. Do not write all the numbers, but do write the words. Indicate the most significant transfer arrows and largest reservoir locations of water by highlighting the arrow or the reservoir label. (Look at the numbers and choose the highest ones. Again, do not write any numbers!)

2. Under the diagram neatly state what the major anthropogenic (human) activities are that can throw this cycle out of balance. (label these as Causes of Imbalance) Then state possible ecological and/or utilitarian effects that could occur if the system becomes out of balance. (label these as Effects of Imbalance)

Hydrologic Cycle (page 86)

Carbon Cycle (page 91)

Nitrogen Cycle (page 95)

For this cycle, do the same as described above. You may omit (do not need to draw) the two inset boxes on the right side of the diagram labeled Nitrogen Fixation and Denitrification.

Phosphorus Cycle (page 96)